

<210> 4
<211> 114
<212> PRT
<213> Homo sapiens

<400> 4
Pro Leu Glu Gly Val Asn Ile Thr Ser Pro Val Arg Leu Ile His Gly
1 5 10 15

Thr Val Gly Lys Ser Ala Leu Leu Ser Val Gln Tyr Ser Ser Thr Ser
20 25 30

Ser Asp Arg Pro Val Val Lys Trp Gln Leu Lys Arg Asp Lys Pro Val
35 40 45

Thr Val Val Gln Ser Ile Gly Thr Glu Val Ile Gly Thr Leu Arg Pro
50 55 60

Asp Tyr Arg Asp Arg Ile Arg Leu Phe Glu Asn Gly Ser Leu Leu Leu
65 70 75 80

Ser Asp Leu Gln Leu Ala Asp Glu Gly Thr Tyr Glu Val Glu Ile Ser
85 90 95

Ile Thr Asp Asp Thr Phe Thr Gly Glu Lys Thr Ile Asn Leu Thr Val
100 105 110

Asp Val

<210> 5
<211> 282
<212> DNA
<213> Homo sapiens

<400> 5
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atggcaagcc ctcctcaat gactcgagaa tgctcctgtc ccccgaccaa aaggtgctca 180
ccatcaccccg cgtgctcatg gaggatgacg acctgtacag ctgcatggtg gagaacccca 240
tcagccaggg cccgagcctg cctgtcaaga tcaccgtata ca 282

<210> 6
<211> 94
<212> PRT
<213> Homo sapiens

<400> 6
Pro Ile Ser Arg Pro Gln Val Leu Val Ala Ser Thr Thr Val Leu Glu
1 5 10 15

Leu Ser Glu Ala Phe Thr Leu Asn Cys Ser His Glu Asn Gly Thr Lys
20 25 30

Pro Ser Tyr Thr Trp Leu Lys Asp Gly Lys Pro Leu Leu Asn Asp Ser
35 40 45

Arg Met Leu Leu Ser Pro Asp Gln Lys Val Leu Thr Ile Thr Arg Val
50 55 60

Leu Met Glu Asp Asp Asp Leu Tyr Ser Cys Met Val Glu Asn Pro Ile
65 70 75 80

Ser Gln Gly Arg Ser Leu Pro Val Lys Ile Thr Val Tyr Arg
85 90

<210> 7
<211> 94
<212> DNA
<213> Homo sapiens

<400> 7
gaagaagctc cctttacatc atcttgtcta caggaggcat cttccctcctt gtgacacctgg 60
tgacagtctg tgccctgctgg aaaccctcca aaag 94

<210> 8
<211> 31
<212> PRT
<213> Homo sapiens

<400> 8
Arg Ser Ser Leu Tyr Ile Ile Leu Ser Thr Gly Gly Ile Phe Leu Leu
1 5 10 15

Val Thr Leu Val Thr Val Cys Ala Cys Trp Lys Pro Ser Lys Arg
20 25 30

<210> 9
<211> 74
<212> DNA
<213> Homo sapiens

<400> 9
gaaacagaag aagctagaaa agcaaaactc cctggaatac atggatcaga atgatgaccg 60
cctgaaacca gaag 74

<210> 10
<211> 25
<212> PRT
<213> Homo sapiens

<400> 10
Lys Gln Lys Lys Leu Glu Lys Gln Asn Ser Leu Glu Tyr Met Asp Gln
1 5 10 15

Asn Asp Asp Arg Leu Lys Pro Glu Ala
20 25

<210> 11
<211> 71
<212> DNA
<213> Homo sapiens

<400> 11
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 tgaaggacaa g 71

<210> 12
 <211> 23
 <212> PRT
 <213> Homo sapiens

<400> 12
 Asp Thr Leu Pro Arg Ser Gly Glu Gln Glu Arg Lys Asn Pro Met Ala
 1 5 10 15

Leu Tyr Ile Leu Lys Asp Lys
 20

<210> 13
 <211> 303
 <212> DNA
 <213> Homo sapiens

<400> 13
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 tctggcccgcc gctaccccg 180
 tgcggccca gggcccccgg 240
 actgcggcg tgcacataat ccgcgagcaa gacgaggccg 300
 tga 303

<210> 14
 <211> 100
 <212> PRT
 <213> Homo sapiens

<400> 14
 Asp Ser Pro Glu Thr Glu Glu Asn Pro Ala Pro Glu Pro Arg Ser Ala
 1 5 10 15

Thr Glu Pro Gly Pro Pro Gly Tyr Ser Val Ser Pro Ala Val Pro Gly
 20 25 30

Arg Ser Pro Gly Leu Pro Ile Arg Ser Ala Arg Arg Tyr Pro Arg Ser
 35 40 45

Pro Ala Arg Ser Pro Ala Thr Gly Arg Thr His Ser Ser Pro Pro Arg
 50 55 60

Ala Pro Ser Ser Pro Gly Arg Ser Arg Ser Ala Ser Arg Thr Leu Arg
 65 70 75 80

Thr Ala Gly Val His Ile Ile Arg Glu Gln Asp Glu Ala Gly Pro Val
 85 90 95

Glu Ile Ser Ala
 100

<210> 15

<211> 1251
<212> DNA
<213> Homo sapiens

<400> 15
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cgcctgatcc atggcaccgt gggaaagtctg gctctgctt ctgtcagta cagcagtacc 180
agcagcgaca ggcctgttagt gaagtggcag ctgaagcggg acaagccagt gaccgtggtg 240
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<210> 16
<211> 416
<212> PRT
<213> Homo sapiens

<400> 16
Met Lys Arg Glu Arg Gly Ala Leu Ser Arg Ala Ser Arg Ala Leu Arg
1 5 10 15

Leu Ala Pro Phe Val Tyr Leu Leu Leu Ile Gln Thr Asp Pro Leu Glu
20 25 30

Gly Val Asn Ile Thr Ser Pro Val Arg Leu Ile His Gly Thr Val Gly
35 40 45

Lys Ser Ala Leu Leu Ser Val Gln Tyr Ser Ser Thr Ser Ser Asp Arg
50 55 60

Pro Val Val Lys Trp Gln Leu Lys Arg Asp Lys Pro Val Thr Val Val
65 70 75 80

Gln Ser Ile Gly Thr Glu Val Ile Gly Thr Leu Arg Pro Asp Tyr Arg
85 90 95

Asp Arg Ile Arg Leu Phe Glu Asn Gly Ser Leu Leu Leu Ser Asp Leu
100 105 110

Gln Leu Ala Asp Glu Gly Thr Tyr Glu Val Glu Ile Ser Ile Thr Asp
115 120 125

Asp Thr Phe Thr Gly Glu Lys Thr Ile Asn Leu Thr Val Asp Val Pro
130 135 140

Ile Ser Arg Pro Gln Val Leu Val Ala Ser Thr Thr Val Leu Glu Leu
145 150 155 160

Ser Glu Ala Phe Thr Leu Asn Cys Ser His Glu Asn Gly Thr Lys Pro
165 170 175

Ser Tyr Thr Trp Leu Lys Asp Gly Lys Pro Leu Leu Asn Asp Ser Arg
180 185 190

Met Leu Leu Ser Pro Asp Gln Lys Val Leu Thr Ile Thr Arg Val Leu
195 200 205

Met Glu Asp Asp Asp Leu Tyr Ser Cys Met Val Glu Asn Pro Ile Ser
210 215 220

Gln Gly Arg Ser Leu Pro Val Lys Ile Thr Val Tyr Arg Arg Ser Ser
225 230 235 240

Leu Tyr Ile Ile Leu Ser Thr Gly Gly Ile Phe Leu Leu Val Thr Leu
245 250 255

Val Thr Val Cys Ala Cys Trp Lys Pro Ser Lys Arg Lys Gln Lys Lys
260 265 270

Leu Glu Lys Gln Asn Ser Leu Glu Tyr Met Asp Gln Asn Asp Asp Arg
275 280 285

Leu Lys Pro Glu Ala Asp Thr Leu Pro Arg Ser Gly Glu Gln Glu Arg
290 295 300

Lys Asn Pro Met Ala Leu Tyr Ile Leu Lys Asp Lys Asp Ser Pro Glu
305 310 315 320

Thr Glu Glu Asn Pro Ala Pro Glu Pro Arg Ser Ala Thr Glu Pro Gly
325 330 335

Pro Pro Gly Tyr Ser Val Ser Pro Ala Val Pro Gly Arg Ser Pro Gly
340 345 350

Leu Pro Ile Arg Ser Ala Arg Arg Tyr Pro Arg Ser Pro Ala Arg Ser
355 360 365

Pro Ala Thr Gly Arg Thr His Ser Ser Pro Pro Arg Ala Pro Ser Ser
370 375 380

Pro Gly Arg Ser Arg Ser Ala Ser Arg Thr Leu Arg Thr Ala Gly Val
385 390 395 400

His Ile Ile Arg Glu Gln Asp Glu Ala Gly Pro Val Glu Ile Ser Ala
405 410 415

<210> 17

<211> 1257

<212> DNA
<213> Mus musculus

<400> 17

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agcaagcgaca agcccggtggt gaagtggcag ctgaagcgtg acaagccagt gaccgtggtg 240
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<210> 18

<211> 418

<212> PRT

<213> Mus musculus

<400> 18

Met Lys Arg Glu Arg Gly Ala Leu Ser Arg Ala Ser Arg Ala Leu Arg
1 5 10 15

Leu Ser Pro Phe Val Tyr Leu Leu Leu Ile Gln Pro Val Pro Leu Glu
20 25 30

Gly Val Asn Ile Thr Ser Pro Val Arg Leu Ile His Gly Thr Val Gly
35 40 45

Lys Ser Ala Leu Leu Ser Val Gln Tyr Ser Ser Thr Ser Ser Asp Lys
50 55 60

Pro Val Val Lys Trp Gln Leu Lys Arg Asp Lys Pro Val Thr Val Val
65 70 75 80

Gln Ser Ile Gly Thr Glu Val Ile Gly Thr Leu Arg Pro Asp Tyr Arg
85 90 95

Asp Arg Ile Arg Leu Phe Glu Asn Gly Ser Leu Leu Leu Ser Asp Leu
100 105 110

Gln Leu Ala Asp Glu Gly Thr Tyr Glu Val Glu Ile Ser Ile Thr Asp
115 120 125

Asp Thr Phe Thr Gly Glu Lys Thr Ile Asn Leu Thr Val Asp Val Pro

130

135

140

Ile Ser Arg Pro Gln Val Leu Val Ala Ser Thr Thr Val Leu Glu Leu
145 150 155 160

Ser Glu Ala Phe Thr Leu Asn Cys Ser His Glu Asn Gly Thr Lys Pro
165 170 175

Ser Tyr Thr Trp Leu Lys Asp Gly Lys Pro Leu Leu Asn Asp Ser Arg
180 185 190

Met Leu Leu Ser Pro Asp Gln Lys Val Leu Thr Ile Thr Arg Val Leu
195 200 205

Met Glu Asp Asp Asp Leu Tyr Ser Cys Val Val Glu Asn Pro Ile Ser
210 215 220

Gln Val Arg Ser Leu Pro Val Lys Ile Thr Val Tyr Arg Arg Ser Ser
225 230 235 240

Leu Tyr Ile Ile Leu Ser Thr Gly Gly Ile Phe Leu Leu Val Thr Leu
245 250 255

Val Thr Val Cys Ala Cys Trp Lys Pro Ser Lys Lys Ser Arg Lys Lys
260 265 270

Arg Lys Leu Glu Lys Gln Asn Ser Leu Glu Tyr Met Asp Gln Asn Asp
275 280 285

Asp Arg Leu Lys Ser Glu Ala Asp Thr Leu Pro Arg Ser Gly Glu Gln
290 295 300

Glu Arg Lys Asn Pro Met Ala Leu Tyr Ile Leu Lys Asp Lys Asp Ser
305 310 315 320

Ser Glu Pro Asp Glu Asn Pro Ala Thr Glu Pro Arg Ser Thr Thr Glu
325 330 335

Pro Gly Pro Pro Gly Tyr Ser Val Ser Pro Pro Val Pro Gly Arg Ser
340 345 350

Pro Gly Leu Pro Ile Arg Ser Ala Arg Arg Tyr Pro Arg Ser Pro Ala
355 360 365

Arg Ser Pro Ala Thr Gly Arg Thr His Thr Ser Pro Pro Arg Ala Pro
370 375 380

Ser Ser Pro Gly Arg Ser Arg Ser Ser Arg Ser Leu Arg Thr Ala
385 390 395 400

Gly Val Gln Arg Ile Arg Glu Gln Asp Glu Ser Gly Gln Val Glu Ile
405 410 415

Ser Ala

<211> 720
<212> DNA
<213> Homo sapiens

<400> 19

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gaggtcgaga tctccatcac cgacgacacc ttcaactgggg agaagaccat caaccttact 420
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<210> 20

<211> 240

<212> PRT

<213> Homo sapiens

<400> 20

Met Lys Arg Glu Arg Gly Ala Leu Ser Arg Ala Ser Arg Ala Leu Arg
1 5 10 15

Leu Ala Pro Phe Val Tyr Leu Leu Ile Gln Thr Asp Pro Leu Glu
20 25 30